

# **A WIRELESS TRANSCEIVER AND METHOD FOR REMOTE ULTRASONIC MEASUREMENTS**

## **Abstract of Disclosure**

A wireless transceiver for performing ultrasonic measurements includes an uplink transmitter configured to transmit at least one modulated timing pulse signal. Each modulated timing pulse signal is transmitted over a respective uplink wireless channel. The transceiver further includes at least one uplink receiver, which is adapted to receive a respective one of the modulated timing pulse signals from the uplink transmitter and configured to supply an unmodulated timing pulse signal to a respective transducer. The transceiver further includes at least one downlink transmitter, which is adapted to receive an echo signal from the respective transducer, and is configured to extract envelope information from the echo signal and to transmit a modulated echo signal over a respective downlink wireless channel. The transceiver also includes a downlink receiver adapted to receive the modulated echo signals from the respective downlink transmitters.

## Figures